

Note: This job description does not form part of the employee's contract of employment but is provided for guidance. The precise duties and responsibilities of any job may be expected to change over time. Job holders should be consulted over any proposed changes in this job description before implementation.

Role Descriptors Outputs and Requirements

Title: Research Associate in Cloud Computing (Ac1 Grade)

Reports to: Head of Department

Department: Computer Science

Professional Values

All Research Associates are required to demonstrate respect for individual learners and be committed to incorporating the process and outcomes of relevant research, scholarship and/or professional practice. All Research Associates are required to be committed to the development of learning communities and encouraging participation in Higher Education, while acknowledging diversity and promoting equality of opportunity. It is also a requirement that all staff are committed to undertaking continuing professional development and evaluation of individual practice and that they are proactive in improving the student experience

Role Purpose

To undertake basic research, including projects/experiments and associated administration.

Principal Accountabilities

1. To understand and make use of standard research techniques and methodologies and to analyse and interpret results from individual research and generate original ideas based on these outcomes.
2. To plan and manage personal day-to-day research activity, within the framework of an agreed programme, and to deal with any problems that may affect the achievement of research objectives and deadlines.
3. To undertake basic research, for example, the preparation, setting up, conducting and recording of experiments and fieldwork, the development of questionnaires, conducting of surveys, literature and database searches; ensuring that results are written up and outcomes are presented to the individual or bodies sponsoring or supervising the research; e.g. steering groups.

4. To contribute to the production of research reports and publications and to prepare papers and documents for individuals or bodies sponsoring or supervising the research as required.
5. To make internal and external contacts and develop knowledge and understanding with a view to forming relationships for future collaboration.
6. To attend and contribute to relevant internal and external meetings and to the decision making process in general, in a positive and collaborative manner.
7. To make a contribution to introductory courses in areas such as the use of research methods and equipment and to assist in the supervision of student projects.
8. It is envisaged the postholder will look to engage in subject, professional and pedagogic research and other scholarly activities which can support teaching activity and where the quality of the outputs can be recognised nationally in terms of originality, significance and rigour.
9. To ensure a personal programme of Continuous Professional development (CPD) is developed and maintained.
10. To have an understanding of individual health and safety responsibilities and an awareness of the risks in the work environment, together with their potential impact on both individual work and that of others.
11. To undertake any other duties within their competence, as required by the University.

CONTEXT

The postholder will possess sufficient breadth or depth of specialist knowledge in the discipline and of research methods and techniques to work within their own area. The postholder will be expected to engage on a programme of continuous professional development (CPD).

The postholder will be expected to actively participate as a member of the research team and have the ability to show consideration to others and liaise with other members of staff (academic, research and support). They will need to co-ordinate their own work with others to avoid either conflict or duplication of effort and be able to contribute to the decisions affecting the work of the team. The postholder will be expected to deal with routine communication using a range of media and be able to communicate effectively.

The postholder has responsibility for ensuring that suitable and sufficient risk assessments are undertaken for the activities for which they are responsible and that measures to control risk are identified and implemented, and communicated to all affected.

They must ensure the provision of adequate supervision and training, to include: the responsibility to work with due regard for the health and safety of themselves and others; familiarity with actions to be taken in the event of emergency; and the duty to report accidents and hazards appropriately.

They will also require a thorough understanding of the diversity and equal opportunities issues.

They have to contribute to research and development activities in the area of parallel and distributed computing and cloud computing, typically within the framework of research projects funded by the European Commission. They have to carry out research and development in Distributed Computing Infrastructures (DCI's), within the framework of the EU COLA, Cloudifactoring, and other research projects inside the CPC; implement technical solutions related to the application level orchestration of clouds and contribute to research on cloud and other DCI's, application porting, and research scientist and industry end-user support

DIMENSIONS

The researcher appointed will do research and development in the areas of parallel and distributed computing, especially in cloud computing, in support of the research projects of the Centre for Parallel Computing. The researcher will design and implement technical solutions required for the application level orchestration of clouds and contribute in general to research in cloud computing, application porting, industry and scientific user support, and DCI management, operational support and technical development at the Centre for Parallel Computing. The researcher will also contribute to the development and delivery of modules and professional short courses related to the research.

**Person Specification
Research Associate (Ac1 Grade)**

Qualifications	Essential	Desirable
<p>Degree</p> <p>Post-Graduate Degree or Professional Qualification</p> <p>PhD or the equivalent in professional qualifications and experience (or working towards this)</p> <p>Teaching Qualification</p>	E	D D D
<p>You will have proven experience and evidence of:-</p> <p>Recognised record of experience in research</p> <p>Subject expertise that is up to-date</p> <p>Contribution to design of teaching or research</p>	E E	D
<p>Skills</p> <p>High level analytical capability</p> <p>Knowledge of relevant research models, techniques and methods</p> <p>Ability to communicate information clearly</p> <p>Ability to encourage commitment to learn in others</p> <p>Ability to assess and organise resources</p>	E E E	D D
<p>Personal Attributes</p> <p>Fully committed to contributing to a stimulating learning and working environment which is supportive and fair, based on mutual respect and trust, and in which harassment and discrimination are</p>	E	

neither tolerated nor acceptable.		
<p>Subject expertise that is up-to-date: Good knowledge and working experience of</p> <ul style="list-style-type: none"> i. C, Java programming languages ii. Linux and/or Unix operating systems iii. System service administration in a networked environment. E.g. web servers, database servers, license servers, web application servers iv. Knowledge transfer v. Knowledge of cloud middleware, e.g. OpenStack vi. Using virtualisation software vii. Experience with Distributed Computing Infrastructures (clouds, grids) viii. Web services ix. Application deployment and support x. Databases 	<p style="text-align: center;">E E E E E E</p>	<p style="text-align: center;">D D D D</p>